

EXHIBIT W

Page 1

1 UNITED STATES DISTRICT COURT
2 NORTHERN DISTRICT OF CALIFORNIA
3 CASE NO. 10-cv-03561-WHA (DMR)

4 ORACLE AMERICA, INC.,

5 Plaintiff,

6
7 vs.
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9 GOOGLE INC.,
10 Defendant.

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14 DEPOSITION OF: HENRIK STAHL

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TRANSCRIPT of the stenographic notes of
the proceedings in the above-entitled matter as
taken by and before RUTHANNE UNGERLEIDER, a
Certified Court Reporter and Notary Public, held at
the office of ORRICK, HERRINGTON & SUTCLIFFE, LLP,
51 West 52nd Street, New York, New York, on
Thursday, March 31, 2016, commencing at
approximately 10:13 in the forenoon.

Job No. CS2279519

1 A I don't know if it makes sense to bring
2 it up as bullets in the document, but I do have
3 extensive knowledge about our product strategy of
4 Java, in particular, starting with 2012, as well
5 as -- I mean, a fair amount of technical knowledge,
6 not necessarily in the same depth as other expert
7 witnesses.

8 Q Do you have any knowledge of Oracle's
9 product strategy for Java prior to 2012?

10 A Some.

11 As I said in my prior deposition, Oracle
12 acquired Sun in 2010 I believe the acquisition
13 closed. At the time of -- at that time, I was
14 responsible for the Enterprise Java implementation.
15 Somewhat later, my responsibilities expanded to
16 include the remaining parts of the Java products
17 family.

18 Q When you say Enterprise Java, do you
19 mean Java EE?

20 A No. I'm sorry, that's easily
21 misunderstood. I mean Java SE when used in an
22 Enterprise environment; in particular, Enterprise
23 servers.

24 Q Does Android compete with Java on the
25 Enterprise side?

1 MS. SIMPSON: Objection to form.

2 MR. MULLEN: Actually, that was a bad
3 question. I'll rephrase that.

4 Q Does Android compete with Java for
5 Enterprise uses?

6 MS. SIMPSON: Objection to form.

7 A Do you mean Enterprise server-side Java?

8 Q Yes.

9 A No, I don't believe so.

10 Q Has it ever competed with Enterprise
11 server-side Java?

12 A Not that I'm aware.

13 Q Prior to 2012, did you have any
14 responsibility for Java ME at Oracle?

15 A So I don't remember the exact date when
16 which my responsibilities expanded to include Java
17 ME, but there was a specific reorganization that
18 happened when I got responsibility for the entire
19 product strategy for all of Java. I believe it was
20 in early 2012. I may be wrong on the date. Prior to
21 that date, whenever it was, I had no responsibility
22 for Java ME at Oracle.

23 Q Were you ever an employee of Sun
24 Microsystems?

25 A No.

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1 Q Do you have any knowledge of Sun's
2 business strategy for Java?

3 A That's a very wide question.

4 Certainly, I have been following it as a
5 spectator during a number of years, but I have no
6 more knowledge than any other spectator would have.
7 And after Oracle's acquisition of Sun I had a number
8 of colleagues that had been working at Sun, and, of
9 course, I spent a fair amount of time talking to
10 these colleagues, some of them were employees of
11 mine, and I learned things after the fact about their
12 strategy. So I guess the answer is yes with the
13 explanation I just stated.

14 Q So is it fair to say that as to events
15 that occurred before Oracle acquired Sun, you have no
16 firsthand knowledge of Sun's business strategy for
17 Java?

18 MS. SIMPSON: Objection to form.

19 A I'm not sure you can accurately make
20 that distinction. I certainly spent a lot of time
21 talking to a number of people that explained some of
22 the history and some of the decisions made. So I
23 wasn't there as it happened because I wasn't part of
24 Sun at the time, but I do have a fair amount of
25 knowledge that I've learned through colleagues,

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1 before, which was the -- an Oracle response to a
2 number of Google questions, and there were, I
3 believe, three or four other documents that were
4 shown to me, that I guess are exhibits in this case,
5 PowerPoint presentation and an e-mail related --

6 MS. SIMPSON: I'm going to caution you,
7 Henrik, not to reveal any conversations with counsel
8 because they're covered by privilege.

9 THE WITNESS: Sorry.

10 A I was shown a few documents.

11 Q Did any of those documents refresh your
12 recollection about any of the issues in this case?

13 A No.

14 Q And why do you say that?

15 A -- none of them really struck me as,
16 "Oh, I actually, I hadn't remembered this, this is
17 completely new to me."

18 There were -- I mean, when I was shown
19 the documents, there were a few details that I
20 remembered that I hadn't necessarily remembered
21 before. If someone had reminded me of a particular
22 document, it would have had the same effect, but I
23 don't think it's fair to say that it refreshed my
24 recollection.

25 Q Did any of the documents inform the

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1 bases for any of your opinions as an expert in this
2 case?

3 A No.

4 MR. MULLEN: Counsel, I think the
5 documents should probably be produced given what he
6 said about refreshing recollection, but we can talk
7 about that during the break.

8 MS. SIMPSON: Okay.

9 Q Did you do anything to search for
10 documents on your own, Mr. Stahl?

11 A No, I did not.

12 There was one thing I did on the way
13 here, which was, I was uncertain about the definition
14 of a smartphone versus a feature phone since that had
15 come up in my prior deposition, and I looked up the
16 Wikipedia pages to see if anyone else were smarter
17 than I when it came to this.

18 Q And what did you find out?

19 A Wikipedia was equally confused.

20 Q What do you mean by "equally confused"?

21 A So I think it's very well stated on the
22 Wikipedia page for the feature phone, there is a
23 section on it that basically goes through the
24 differences between smartphone and feature phone, and
25 that section states that there is no clear

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1 distinction between a smartphone and a feature phone,
2 and as a matter of fact the word "smartphone" has
3 been used over the years frequently to describe the
4 most current phone technology, and then as time
5 passes what was called smartphone is no longer called
6 it. So it's a sliding scale that changes with time.

7 Q At a fixed point in time, do you believe
8 that there is a difference between a smartphone and a
9 feature phone?

10 A So that's the thing, I don't think that
11 that's accurate because I think it's always a sliding
12 scale, and it may be that the term "feature phone"
13 today is used to describe something that wasn't
14 called a feature phone when such phones existed.

15 Q Let's take today, for example.

16 If I asked you what the difference today
17 is between a smartphone and a feature phone, what
18 would you say?

19 MS. SIMPSON: Objection to form.

20 MR. MULLEN: That is a good objection.

21 Q Today, what is the difference between a
22 smartphone and a feature phone, if any?

23 MS. SIMPSON: Objection to form.

24 A So I believe if you ask a random person
25 on the street, I believe that person, when you say

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1 "What's a smartphone," would specifically say, "Oh,
2 it's an iPhone, right, or it's a Samsung Galaxy," so
3 that kind of will describe what smartphone is.

4 Many people would say, if they're shown,
5 you know, an old BlackBerry phone with a keyboard,
6 that it's a smartphone, but I think a lot of other
7 people would say that it's not.

8 So I don't really know what the good
9 answer is, I'm sorry.

10 Q Well, I'm just asking you for your best
11 testimony, not necessarily what other people would
12 say.

13 What do you think, today, is the
14 difference, if any, between a smartphone and a
15 feature phone?

16 A And I have to go back to what I said a
17 couple minutes ago. I looked up the Wikipedia pages
18 because I was confused and I didn't have a clear
19 definition, and I still don't have a clear
20 definition.

21 Q Have you reviewed any deposition
22 transcripts other than your own in this case?

23 A No.

24 Q Have you reviewed any of the trial
25 transcripts from the previous trial?

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1 A No.

2 Q Did you review any expert reports from
3 this case?

4 A No.

5 Q And other than lawyers, have you talked
6 to anybody about your deposition?

7 A Only in extremely general terms, like
8 mentioning that I was here, mentioning how many hours
9 it took, and tell people, such as my wife, that it
10 was in relation to the Oracle versus Google trial. I
11 have not discussed any details of the deposition with
12 anyone.

13 Q Have you ever spoken with any of the
14 expert witnesses retained by Oracle in this case?

15 A And just to clarify, these are the names
16 that were culled out in this -- no.

17 Q No.

18 I'll ask you, actually, the names. I'll
19 name the expert witnesses that Oracle has retained in
20 this case and you can tell me if you have ever spoken
21 with them.

22 Adam Jaffee?

23 A No.

24 Q Chris Kemerer?

25 A No.

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1 Q James Malackowski?

2 A No.

3 Q Gwen Murray?

4 A I recognize the name, but I -- I may be
5 wrong -- I don't think I spoke to her.

6 I'm sorry, where was she employed? Who
7 did she work for?

8 Q I don't know the answer to that offhand,
9 I apologize.

10 A Maybe I know someone else with the same
11 name.

12 I don't think I ever spoke to anyone
13 with that name who was an expert witness in this
14 case.

15 Q Have you ever spoken with Douglas
16 Schmidt?

17 A No.

18 Q Oliver Toubia?

19 A No.

20 Q Robert Zeidman?

21 A No.

22 Q Other than the three or four documents
23 that you mentioned you reviewed yesterday in
24 preparation for your deposition, have you reviewed
25 any documents specifically for this litigation?

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1 A Beyond my -- the transcript from my old
2 deposition and the exhibits that -- that you brought
3 up with me then, no.

4 Q Have you prepared any summary or
5 demonstrative of any opinions you might have in this
6 case?

7 A No.

8 Q Have you prepared any summary or
9 demonstrative or analysis of any kind in connection
10 with this case?

11 A No.

12 Q Do you expect to do so between now and
13 the time of trial?

14 A No one has asked me for anything yet, so
15 no.

16 Q Do you expect to testify at trial?

17 A I don't know. I think there is a fair
18 chance I will be asked to, but I don't know.

19 Q Have you discussed that with anybody
20 other than your attorneys?

21 A Well, my wife.

22 Q Anybody else?

23 A I may have mentioned it to my kids.
24 Beyond that, no.

25 Actually, that's not correct. I told my

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1 direct manager, for example, that I may have to
2 testify at trial, so people that I work with for whom
3 this matter, for planning purposes, like you can't
4 necessarily plan for me to do other work during this
5 period of time, I told that I may be at the trial,
6 and there may be a few more people in that group.

7 Q Let's hand you a document that has been
8 already marked in a previous deposition as 1585. I
9 apologize, I don't have a copy with the sticker.

10 A So this is the document that I mentioned
11 that I was sent about a week ago.

12 Q Was that the first time you had ever
13 seen that document?

14 A Yes, I believe so.

15 Q So you didn't have any input on the
16 content of the document, correct?

17 A Not that I'm aware.

18 Q Okay.

19 If you could turn to page four, and do
20 you see there your name listed with several bullet
21 points in the paragraph of text beneath it?

22 A Yes.

23 Q And do you understand that those are the
24 topics, generally, on which you have been disclosed
25 as somebody who might have expert testimony?

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1 Q Do you know approximately when Android
2 was announced, Mr. Stahl?

3 A Approximately, I believe it was in 2006.
4 Could be '07, I may be wrong.

5 Q And prior to the introduction of
6 Android, you weren't an employee of Sun Microsystems,
7 correct?

8 A I was never an employee of Sun
9 Microsystems.

10 Q Nor were you an employee of Oracle prior
11 to the introduction of Android, correct?

12 A If my dating of the introduction of
13 Android is correct, I became an employee at Oracle
14 with the acquisition of BEA Systems, which was in
15 2007. I believe that was after the introduction of
16 Android.

17 Q So any knowledge you have regarding the
18 market for Java before the introduction of Android
19 would not be knowledge that you had gained within the
20 scope of your employment with either Sun or Oracle,
21 correct?

22 MS. SIMPSON: Objection to form.

23 A We're looking at the time frame up to
24 2007?

25 Q I would like to look at the time frame

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1 prior to the introduction of Android.

2 A Correct. Right. So up until the time I
3 started working for Oracle, because of the
4 acquisition, I obviously had no insight as an
5 employee of Sun or Oracle.

6 Q Any other opinions you have regarding
7 the market for Java before the introduction of
8 Android beyond what you said already today?

9 A I'm sorry, I thought I gave a fairly
10 broad answer to a broad question.

11 I believed it was dominant in a number
12 of markets.

13 Q What types of markets?

14 A So phones were certainly one.
15 Enterprise servers was one. That one was one I had a
16 lot of personal familiarity with as a development
17 environment for cross platform desktop applications,
18 as a development environment for advanced web
19 applications through what was called applets. I was
20 also, at the time, generally familiar with the fact
21 that Java was present in a large number of other
22 markets, such as, you know, set-top boxes and other
23 media devices, embedded devices, and smart cards.
24 Most of that knowledge came from, you know, visiting
25 Java One and learning information from Sun's

1 marketing and things.

2 Q The familiarity and the knowledge you
3 just described in your previous answer, that came
4 simply from being, as you put it, a spectator in the
5 industry, correct?

6 MS. SIMPSON: Objection to form.

7 A And a user.

8 Q But not as an employee of either Oracle
9 or Sun?

10 A That's correct.

11 Q The markets you described in your
12 previous answer, do you believe that any of those
13 markets have been harmed by the introduction of
14 Android?

15 A Yes.

16 Q Which of those markets are you referring
17 to specifically?

18 A So certainly phones, but it extends far
19 beyond that.

20 Any market where there is a
21 consumer-type device, multi-media entertainment
22 dashboard or smart TV or some other type of device
23 with a programming environment, or even broader than
24 that, any type of device in an embedded context that
25 has a user interface.

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1 Q So maybe I should clarify my question.

2 Prior to the introduction of Android,
3 what markets was Sun licensing Java for?

4 A Phones, set-top boxes, media players. I
5 don't recall when Blu-ray players were introduced,
6 but certainly Blu-ray players.

7 I believe it was used -- I know it was
8 used in ATM machines, I know it was used in printers,
9 and there are several other areas.

10 Q What other areas?

11 A Many of them are mentioned later in this
12 document.

13 I don't know when the Kindle was
14 introduced, but E-readers for sure. IP phones, this
15 is like the phone we have on this table today, I
16 believe runs Java. Home gateways.

17 Q What types -- strike that.

18 Prior to the introduction of Android,
19 who were Sun's competitors in the market for mobile
20 phones?

21 A So it's interesting to talk about
22 competitors.

23 Sun licensed Java to a large number of
24 different players and Java was integrated into a
25 variety of mobile platforms and operating systems.

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1 So Sun competitors would be companies that, for
2 whatever reason, either licensed a competing product
3 or choose to push an alternative technology. I think
4 the main one would have been a Windows phone, I don't
5 actually know what that product was called then, but
6 Microsoft's smartphone -- sorry, actually, smartphone
7 stack is incorrect. Microsoft phone stack, I think
8 it was called Windows CE, or something like that, and
9 I guess you could argue that iOS was a competing
10 technology, but it never competed with Java in the
11 market. But beyond that, pretty much everyone was
12 using Android -- sorry -- was using Java. They
13 licensed it from Sun and incorporated it into
14 their stacks.

15 Q Why do you say that iOS never competed
16 with Java in the market?

17 A Because iOS has never been licensed or
18 sold separately, it's always been only an integrated
19 part of Apple iPhone related products.

20 Q Do you believe that introduction of iOS
21 and the rise of the iPhone harmed the market for
22 Java-based mobile phones?

23 A Actually, I do not.

24 I believe that if we assume that Android
25 had never existed, the introduction of the iPhone

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1 A No.

2 Q Have you ever had responsibility for
3 Java sales?

4 A I've never had responsibility for Java
5 sales. I've had responsibility for Java's product
6 strategy.

7 Q Have you ever had responsibility for
8 Java licensing?

9 A Yes, that was part of my work
10 responsibility, but I have to qualify that.

11 Licensing is a very, very broad topic,
12 but certain things I was directly responsible for,
13 like the licensing text that we use to license, you
14 know, Java SE in the Enterprise context, so I kind of
15 own that document from an Oracle perspective for a
16 number of years.

17 Q Other than the use of Java in an
18 Enterprise context, have you ever had responsibility
19 for Java licensing?

20 A I'm sorry, you have to clarify. Are we
21 talking commercial licensing of Java?

22 Q Correct.

23 A I was in the review and approval queue
24 for Java licensing deals.

25 Q What types of licensing deals?

1 A So anytime Oracle closes a commercial
2 contract with a customer, there is -- typically,
3 there is a standard contract form that can be used
4 and there is standardized pricing that can be used
5 and there are certain things that a salesperson can
6 negotiate.

7 If, as frequently happens, if it's a
8 complex deal, there are certain terms that the
9 customer would like changed, maybe it's the timeline
10 of the deal, maybe they would like a discount because
11 of a very large volume buy or something similar, then
12 the contract would have to be modified, and those
13 modifications would have to be approved. Who
14 approved them depends on the scope of the change. In
15 some cases, I was the final approver for things like
16 this; in other cases, I was an intermediate approver
17 and it would have to go to a more senior executive
18 for final approval.

19 Q Is it your opinion that Android has
20 harmed the market for Java in Internet of Things type
21 devices?

22 A So Internet of Things is a very poorly
23 defined term.

24 Q I'm just looking at what's --

25 A Yeah, I know.

1 My title is Internet of Things, but even
2 so, I think it's a poorly defined term.

3 There are a lot of markets that fall
4 under the umbrella Internet of Things, and in the
5 parts of those markets where Android is a viable
6 technology it has significantly hurt Oracle's chances
7 of selling Java.

8 Q And has Oracle ever actually lost a deal
9 in the market for the Internet of Things to Android?

10 A Many times.

11 Q And what are some examples?

12 A Smart TVs is one example. Java had a
13 strong presence in TVs, still does in some segments
14 of the TV and general media player space, but many of
15 those vendors have moved on to Android as a platform
16 instead.

17 Java had -- I don't know the exact size
18 of Java, but Java had presence in the multi-media
19 entertainment space, and, again, that is a space
20 which Android is extremely strong in today and it's
21 practically impossible to sell Java because of the
22 existence of Android.

23 That is just a few examples. There are
24 more in the end of this document.

25 Q So let me clarify.

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1 Is it your understanding that the
2 Internet of Things includes products such as TVs and
3 cars and wearable devices?

4 A That's what I'm saying. It's a very
5 vaguely defined term, but I think yes.

6 If you use the term "Internet of Things"
7 the way it is being used by most people, including,
8 you know, media and the conferences, and so on and so
9 forth, it's an incredibly encompassing term that
10 covers a large set of consumer-facing devices as well
11 as devices that target more industrial, commercial
12 uses cases.

13 Q And you don't -- so you see TVs,
14 wearables and cars as all part of the same market?

15 MS. SIMPSON: Objection to form.

16 A No, I think they're a large series of
17 related markets.

18 Q Okay.

19 Is that different from the Internet of
20 Things or is Internet of Things more of an umbrella
21 term that covers them all?

22 A Internet of Things is more of an
23 umbrella term that covers all of these.

24 Q Is it your opinion that the processing
25 power of mobile phones and other small devices has

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1 increased rapidly with the evolution of hardware for
2 those devices?

3 A Yes.

4 Q Do you believe -- is it your opinion
5 that Java has fragmented -- or, excuse me, Android
6 has fragmented Java?

7 A Yes.

8 Q What is the basis for that opinion?

9 A I believe we discussed that in my last
10 deposition.

11 The general problem is that if you look
12 at Java and Android as a variant of Java, if you
13 will, Java-like, you cannot directly take the skills
14 and tools and so on that you have gained by working
15 on Java SE and then transferring them to Android, you
16 have to relearn certain things, and vice versa.

17 Android may be similar to Java, but if you start by
18 working on Android, you cannot immediately transfer
19 those skills and tools and so on and so forth and
20 start working on Java, you have to relearn certain
21 things.

22 And I actually believe that these
23 platforms have grown more apart over time because
24 when Android was first introduced, it was kind of
25 based on something that was a subset of Java SE5, and

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1 Java is now up to Java 8, with significant
2 innovations and enhancements going into it.

3 So that was like a split in the
4 community when Android was introduced, and that
5 split, the rift, if you will, has deepened.

6 Now, some people still work on both
7 technologies and are able to do that, but there were
8 also people that worked exclusively on Java SE and
9 don't work on Android and vice versa.

10 The fact that this split occurred and
11 this rift in the market occurred, you may not be able
12 to use the exact same tools, certainly not the exact
13 same libraries, is, in my book, fragmentation. I
14 think that hurt Java, I think it hurt Oracle, both
15 from a community and a commercial perspective, and I
16 think it hurt the community as an entity perspective.

17 Q Have you done any analysis of any
18 commercial impact due to fragmentation of Java?

19 A Analysis? No.

20 Q Is there another word you would use?

21 A I'd say indications, if you will.

22 Q And what are those indications?

23 A So we have, over the years, a number of
24 times -- well, okay.

25 Let me give you an example.